

The following listing of claims will replace all prior versions and listings of claims in the present application.

1. (Previously Presented) A transdermal therapeutic system (TTS) comprising an active-substance-containing cement matrix, wherein the cement matrix comprises a hot-melttable adhesive in which the active substance is dispersed and melted using a hot-melt process, and wherein the active substance is rotigotine and is partly or completely dissolved in the adhesive.
2. (Previously presented) The TTS of claim 1, wherein the active-substance-containing cement matrix is produced by preparing a solvent-free melt of the cement matrix and metering the rotigotine into the solvent-free melt at a temperature between 70°C and 200°C.
3. (Previously presented) The TTS of claim 1, wherein the hot-melttable adhesive comprises an amine-resistant silicone adhesive and, in mixture therewith, at least one pharmaceutically acceptable softener.
4. (Previously presented) The TTS of claim 3, wherein the at least one softener is an organic wax.
5. (Previously presented) The TTS of claim 3, wherein the at least one softener is ceresine or ozokerite.
6. (Previously presented) The TTS of claim 1, wherein the cement matrix comprises 4–40 weight % rotigotine.
7. (Previously presented) The TTS of claim 1, wherein the cement matrix comprises 9–30 weight % rotigotine.
8. (Previously presented) The TTS of claim 1, wherein the cement matrix comprises 20–40 weight % rotigotine.
9. (Previously presented) The TTS of claim 1, wherein the rotigotine is present in free-base form.

10. (Previously presented) The TTS of claim 1, wherein the active-substance-containing cement matrix further comprises an internal-phase component selected from the group consisting of
 - (a) hydrophilic and amphiphilic polymers and mixtures thereof with pharmaceutically acceptable softeners,
 - (b) hydrophilic and amphiphilic copolymers and mixtures thereof with pharmaceutically acceptable softeners,
 - (c) condensates of glycerin and fatty acids,
 - (d) condensates of glycerin and polyols, and
 - (e) mixtures of components (a)–(d).
11. (Previously presented) The TTS of claim 1, wherein the active-substance-containing cement matrix further comprises at least one internal-phase component selected from the group consisting of polysaccharides, substituted polysaccharides, polyethylene oxides, polyvinyl acetates, polyvinyl pyrrolidones, copolymers of polyvinyl pyrrolidone and polyvinyl acetate, polyethylene glycol, polypropylene glycol, copolymers of ethylene and vinyl acetate, glycerin-fatty acid esters and mixtures of polyvinyl alcohol with glycerin.
12. (Previously presented) The TTS of claim 1, wherein the cement matrix comprises
 - (a) 50–99 weight % of a hot-meltable adhesive,
 - (b) 4–40 weight % of rotigotine,
 - (c) 0–40 weight % of an internal-phase component, and
 - (d) 0–10 weight % of other adjuvants.
13. (Previously presented) The TTS of claim 12, wherein the hot-meltable adhesive is an EVA adhesive, an SXS adhesive, or a mixture of (i) 70–99 weight % of an amine-resistant silicone adhesive and (ii) 1–30 weight % of a pharmaceutically acceptable softener.

14. (Currently amended) The TTS of claim 12, wherein the rotigotine is present in an amount effective, upon application of the TTS on skin of a human patient, to induce an average plasma concentration of 0.4 to 2 ng/ml rotigotine ~~is induced~~ in the patient for a period of at least 5 days following said application.
15. (Previously presented) The TTS of claim 14, wherein the rotigotine is present in an amount effective to induce an average plasma concentration of 0.4 to 2 ng/ml rotigotine ~~is induced~~ in the patient for a period of at least 7 days following said application.
16. (Previously presented) The TTS of claim 1, wherein the rotigotine is present in an amount effective, upon application of the TTS on skin of a human patient, to provide transport of rotigotine ~~is transported~~ through the skin at a steady-state flux rate of 200–300 µg per hour.
17. (Cancelled)
18. (Previously presented) A method for preparing a TTS that comprises a rotigotine-containing cement matrix, the method comprising melting and homogenizing components of the cement matrix, solvent-free, in an extruder at a temperature between 70°C and 200°C prior to lamination of the components.
19. (Cancelled)
20. (Previously presented) A method for preparing a TTS that comprises a rotigotine-containing cement matrix the method comprising pre-melting and homogenizing components of the cement matrix other than the rotigotine, solvent-free, and introducing rotigotine at a temperature between 70°C and 200°C, into the pre-melted cement matrix.
21. (Previously presented) The method of Claim 20, wherein the rotigotine is introduced into the pre-melted cement matrix at a temperature between 120°C and 160°C.
22. (Previously presented) The method of Claim 20, wherein the rotigotine is introduced in solid state into the pre-melted cement matrix.

23. (Previously presented) The method of Claim 20, wherein the rotigotine in the cement matrix so prepared has a purity level of at least 98% as measured by HPLC at 220 nm and 272 nm.
24. (Previously presented) The method of Claim 18, wherein the melting takes place at a temperature between 120°C and 160°C.
25. (Previously presented) The method of Claim 20, wherein the rotigotine in the cement matrix so prepared has a purity level of at least 98% as measured by HPLC at 220 nm and 272 nm.
26. (New) The TTS of claim 1, wherein the rotigotine is present in a therapeutically effective amount for treatment of a disease associated with a dopamine-metabolism disorder in a human patient, by application of the TTS on skin of the patient.
27. (New) The TTS of claim 26, wherein the disease associated with a dopamine-metabolism disorder is Parkinson's disease.
28. (New) The TTS of claim 26, wherein the disease associated with a dopamine-metabolism disorder is restless leg syndrome.
29. (New) A method for treating a disease associated with a dopamine-metabolism disorder in a human patient, comprising applying to skin of the patient a TTS of Claim 1 in a therapeutically effective amount.
30. (New) The method of claim 29, wherein the disease associated with a dopamine-metabolism disorder is Parkinson's disease.
31. (New) The method of claim 29, wherein the disease associated with a dopamine-metabolism disorder is restless leg syndrome.